



Louisville Metro Air Pollution Control District
701 West Ormsby Avenue, Suite 303
Louisville, Kentucky 40203-3137



Title V Construction Permit

Permit No.: C-0036-22-0010-V

Plant ID: 0036

Effective Date: 06/14/2022

Expiration Date: 06/30/2023

Source: Clariant Corporation (West)
1227 South 12th Street
Louisville, KY 40232

Owner: Clariant Corporation
500 E. Morehead Street
Charlotte, NC 28202


is authorized to install the described process equipment by the Louisville Metro Air Pollution Control District. Authorization is based on information provided with the application submitted by the company and in accordance with applicable regulations and the conditions specified herein.

Process equipment description:

Changes and/or modifications to nineteen of the emission units (Emission Units W03, W05, W09, W11, W12, W14, W22, W23, W25, W35, W36, W39, W42, W51, W53, W54, W57, W58, and W70) of Clariant West Plant to correct reported deviations.

Public Notice Date: 05/13/2022

Permit writer: Karen Thorne

DocuSigned by:

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Air Pollution Control Officer
6/14/2022

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Construction Permit Revisions and Changes

Permit No.	Public Notice	Issue Date	Change Type	Description/Scope
C-0036-22-0010-V	05/14/22 - 06/13/22	06/14/2022	Initial	Entire Permit

Application and Related Documents

Document Number	Date	Description
235684	12/01/20	Confidential PTE (flash drive)
235685	12/01/20	Public PTE (flash drive)
178637	12/02/20	Updated STAR EA demonstration and PTE (email)
221489	12/02/20	Updated STAR EA demonstration AERMOD files
221490	12/02/20	Updated STAR EA demonstration SCREEN3 files
178778	12/04/21	Permit deviations
186370	02/02/21	Public Modification Application
186363	02/02/21	Confidential Modification Application
233614	07/01/21	Stack test and updated STAR EA demonstration
235425	07/07/21	Updated STAR EA demonstration
235701	07/09/21	Updated public PTE
235700	07/09/21	Updated confidential PTE
287054	08/18/21	Updated W55 public PTE
287055	08/18/21	Updated W55 confidential PTE
334345	08/02/21	Updated W70 equipment public
334344	08/02/21	Updated W70 equipment confidential
287041	08/25/21	Updated public PTE for W23 and W70
287040	08/25/21	Updated confidential PTE for W23 and W70
249574	08/25/21	Public application for new control BV-250-W55-306B
249573	08/25/21	Confidential application for new control BV-250-W55-306B

Document Number	Date	Description
249574	08/25/21	Public PTE for new control BV-250-W55-306B
249573	08/25/21	Confidential PTE for new control BV-250-W55-306B
287047	08/26/21	Updated public application forms for W17
287046	08/26/21	Updated confidential application forms for W17
287048	08/26/21	Public application for W03 equipment removal
287051	08/26/21	Confidential application for W03 equipment removal
253310	08/31/21	Confidential application updates for W36, W39, W53, W57
253311	08/31/21	Public application updates for W36, W39, W53, W57
286999	09/09/21	Updated public PTE
287000	09/09/21	Updated confidential PTE
286993	09/24/21	W02 Tank replacement public application
286994	09/24/21	W02 Tank replacement confidential application
286992	09/24/21	W02 Tank replacement public emission calculations
286991	09/24/21	W02 Tank replacement confidential emission calculations
328841	04/01/22	Draft permit informal comments from company
335336	04/14/22	EU W09 copper emissions

Abbreviations and Acronyms

AP-42	- AP-42, Compilation of Air Pollutant Emission Factors, published by U.S.EPA
APCD	- Louisville Metro Air Pollution Control District
BAC	- Benchmark Ambient Concentration
BACT	- Best Available Control Technology
Btu	- British thermal unit
CEMS	- Continuous Emission Monitoring System
CFR	- Code of Federal Regulations
CO	- Carbon monoxide
District	- Louisville Metro Air Pollution Control District
EA	- Environmental Acceptability
gal	- U.S. fluid gallons
GHG	- Greenhouse Gas
HAP	- Hazardous Air Pollutant
Hg	- Mercury
hr	- Hour
in.	- Inches
lbs	- Pounds
l	- Liter
LMAPCD	- Louisville Metro Air Pollution Control District
mmHg	- Millimeters of mercury column height
MM	- Million
(M)SDS	- (Material) Safety Data Sheet
NAICS	- North American Industry Classification System
NO _x	- Nitrogen oxides
PM	- Particulate Matter
PM ₁₀	- Particulate Matter less than 10 microns
PM _{2.5}	- Particulate Matter less than 2.5 microns
ppm	- parts per million
PSD	- Prevention of Significant Deterioration
psia	- Pounds per square inch absolute
QA	- Quality Assurance
RACT	- Reasonably Available Control Technology
SIC	- Standard Industrial Classification
SIP	- State Implementation Plan
SO ₂	- Sulfur dioxide
STAR	- Strategic Toxic Air Reduction
TAC	- Toxic Air Contaminant
UTM	- Universal Transverse Mercator
VOC	- Volatile Organic Compound
w.c.	- Water column
year	- Any period of twelve consecutive months, unless "calendar year" is specified
yr	- Year, or any 12 consecutive-month period, as determined by context

Preamble

This permit covers only the provisions of Kentucky Revised Statutes Chapter 77 Air Pollution Control, the regulations of the Louisville Metro Air Pollution Control District (District) and, where appropriate, certain federal regulations. The issuance of this permit does not exempt any owner or operator to whom it has been issued from prosecution on account of the emission or issuance of any air contaminant caused or permitted by such owner or operator in violation of any of the provisions of KRS 77 or District regulations. Any permit shall be considered invalid if timely payment of annual fees is not made. The permit contains general permit conditions and specific permit conditions. General conditions are applicable unless a more stringent requirement is specified elsewhere in the permit.

General Conditions

- G1. The owner or operator of the affected facility covered by this permit shall notify the District of any process change, equipment change, material change, or change in method or hours of operation. This requirement is applicable to those changes (except equipment changes) that may have the potential for increasing the emission of air contaminants to a level in excess of the applicable limits or standards specified in this permit or District regulations.
- G2. The owner or operator shall obtain new or revised permits from the District in accordance with District Regulation 2.16 for Title V sources, District Regulation 2.17 for FEDOOP sources or District Regulation 2.03 for other sources including:
 - a. The company relocates to a different physical address.
 - b. The ownership of the company is changed.
 - c. The name of the company as shown on the permit is changed.
 - d. Permits are nearing expiration or have expired.
- G3. The owner or operator shall submit a timely application for changes according to G2. Timely renewal is not always achievable; therefore, the company is hereby authorized to continue operation in compliance with the latest District permit(s) until the District issues the renewed permit(s).
- G4. The owner or operator shall not be authorized to transfer ownership or responsibility of the permit. The District may transfer permits after appropriate notification (Form AP- 100A) has been received and review has been made.
- G5. The owner or operator shall pay the required permit fees within 45 days after issuance of the SOF by the District, unless other arrangements have been proposed and accepted by the District.
- G6. This permit allows operation 8,760 hours per year unless specifically limited elsewhere in this permit.
- G7. The owner or operator shall submit emission inventory reports as required by Regulation 1.06.
- G8. The owner or operator shall timely report abnormal conditions or operational changes, which may cause excess emissions as required by Regulation 1.07.
- G9. Unless specified elsewhere in this permit, the owner or operator shall complete required monthly record keeping within 30 days following the end of each calendar month.
- G10. If a change in the Responsible Official (RO) occurs during the term of this permit, the owner or operator shall provide written notification (Form AP-100A) to the District within 30 calendar days of the date the RO change occurs.

G11. **Other Applicable Regulations** - The owner or operator shall comply with all applicable requirements of the following:

Regulation	Title
1.01	General Application of Regulations and Standards
1.02	Definitions
1.03	Abbreviations and Acronyms
1.04	Performance Tests
1.05	Compliance With Emissions Standards And Maintenance Requirements
1.06	Source Self-Monitoring, Emission Inventory Development and Reporting
1.07	Excess Emissions During Startups, Shutdowns, and Upset Conditions
1.08	Administrative Procedures
1.09	Prohibition of Air Pollution
1.10	Circumvention
1.11	Control of Open Burning
1.14	Control of Fugitive Particulate Emissions
1.18	Rule Effectiveness
1.19	Administrative Hearings
2.01	General Application (Permit Requirements)
2.02	Air Pollution Regulation Requirements and Exemptions
2.03	Authorization to Construct or Operate; Demolition/Renovation Notices and Permit Requirements
2.04	Construction or Modification of Major Sources in or Impacting Upon Non-Attainment Areas (Emission Offset Requirements)
2.05	Prevention of Significant Deterioration
2.06	Permit Requirements – Other Sources
2.07	Public Notification for Title V, PSD, and Other Offset Permits; SIP Revisions; and Use of Emission Reduction Credits
2.09	Causes for Permit Modification, Revocation, or Suspension
2.10	Stack Height Considerations
2.11	Air Quality Model Usage
3.01	Ambient Air Quality Standards
4.01	General Provisions for Emergency Episodes
4.02	Episode Criteria
4.03	General Abatement Requirements
4.04	Particulate and Sulfur Dioxide Reduction Requirements
4.05	Hydrocarbon and Nitrogen Oxides Reduction Requirements
4.06	Carbon Monoxide Reduction Requirements
4.07	Episode Reporting Requirements
6.01	General Provisions (Existing Affected Facilities)
6.02	Emission Monitoring for Existing Sources
7.01	General Provisions (New Affected Facilities)

District Only Enforceable Regulations:

Regulation	Title
1.12	Control of Nuisances
1.13	Control of Objectionable Odors
2.08	Emission Fee, Permit Fees and Permit Renewal Procedures
2.16	Title V Operating Permits
5.00	Definitions
5.01	General Provisions
5.02	Adoption and Incorporation by Reference of National Emission Standards for Hazardous Air Pollutants
5.14	Hazardous Air Pollutants and Source Categories
5.15	Chemical Accident Prevention Provisions
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant
5.21	Environmental Acceptability for Toxic Air Contaminants
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant
5.23	Categories of Toxic Air Contaminants
7.02	Adoption and Incorporation by Reference of Federal New Source Performance Standards

Plantwide Specific Conditions

Applicable Regulations

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
2.04	Construction or Modification of Major Sources In or Impacting Upon Non-Attainment Areas (Emission Offset Requirements)	1 through 5
2.05	Prevention of Signification Deterioration of Air Quality	1, 2
2.16	Title V Operating Permits	1 through 6
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Plantwide Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. HAP

- i. The owner or operator shall not allow plantwide single HAP emissions to exceed 10 tons per consecutive 12-month period for each HAP. [Regulation 2.16, section 4.1.1]
- ii. The owner or operator shall not allow plantwide total HAP emissions to exceed 25 tons per consecutive 12-month period. [Regulation 2.16, section 4.1.1]
- iii. Management Practices. The owner or operator shall comply with the following paragraphs. [40 CFR 63 Subpart VVVVVV]
 - 1) Each process vessel must be equipped with a cover or lid that must be closed at all times when it is in metal HAP service, except for manual operations that require access, such as material addition and removal, inspection, sampling and cleaning. This requirement does not apply to process vessels containing only metal HAP that are in a liquid solution or other form that will not result in particulate emissions of metal HAP (e.g., metal HAP that is in ingot, paste, slurry, or moist pellet form or other form). [40 CFR 63.11495(a)(1)]
 - 2) The owner or operator must conduct inspections of process vessels and equipment for each CMPU in metal HAP service, as specified in the following paragraphs to demonstrate compliance to determine that the process vessels and equipment are sound and free of leaks. [40 CFR 63.11495(a)(3)]
 - 3) The owner or operator must repair any leak within 15 calendar days after detection of the leak, or document the reason for any delay of repair. For the purposes of this paragraph, a leak will be considered “repaired” if a condition specified in one of the following paragraphs is met. [40 CFR 63.11495(a)(4)]
 - (a) The visual, audible, olfactory, or other indications of a leak to the atmosphere have been eliminated, or
 - (b) No bubbles are observed at potential leak sites during a leak check using soap solution, or
 - (c) The system will hold a test pressure.
 - 4) The owner or operator must keep records of the dates and results of each inspection event, the dates of equipment repairs, and, if applicable, the reasons for any delay in repair. [40 CFR 63.11495(a)(5)]

- i. Startup, shutdown, and malfunction (SSM) provisions in subparts that are referenced in 40 CFR 63.11495(a) and (b) do not apply. [40 CFR 63.11495(c)]
- ii. General duty. At all times, the owner or operator must operate and maintain any affected CPMU, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. Determination of whether such operation and maintenance procedures are being used will be based on information available to the District, which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the CPMU. [40 CFR 63.11495(d)]
- iii. Emissions from metal HAP process vents. For all metal HAP process vents from each CPMU with collective uncontrolled metal HAP emissions equal to or greater than 400 lb/yr, the owner or operator shall reduce collective uncontrolled emissions of total metal HAP emissions by ≥ 95 percent by weight by routing emissions from a sufficient number of the metal process vents through a closed-vent system to any combination of control devices, according to the requirements of §63.11496(f)(3). The requirements of this paragraph §63.11496(f) do not apply to metal HAP process vents from CPMU containing only metal HAP that are in a liquid solution or other form that will not result in particulate emissions of metal HAP (e.g., metal HAP that is in ingot, paste, slurry, or moist pellet form or other form). [40 CFR 63.11496(f) and Table 4]

b. Opacity

The owner or operator shall not allow or cause visible emissions to equal or exceed twenty percent (20%) opacity. [Regulations 6.09, section 3.1, and 7.08, section 3.1.1]

c. PM/PM₁₀/PM_{2.5}, NO_x and VOC

The owner or operator shall not allow or cause the plantwide emissions of PM/PM₁₀/PM_{2.5}, NO_x or VOC to equal or exceed 100 tons during any consecutive 12-month period. [Regulations 2.04 and 2.05]

d. TAC

The owner or operator shall not allow emissions of any TAC to exceed environmentally acceptable (EA) levels, whether specifically established by modeling or determined by the District to be de minimis. [Regulations 5.00 and 5.21] (See Comment 1.)

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. HAP

- i. For each HAP emission point, the owner or operator shall calculate and record the monthly throughput of each HAP-containing raw material and the HAP content. HAP content in both base metal form and compound form shall be kept for HAP compounds.
- ii. The owner or operator shall calculate and record the plantwide consecutive 12-month emissions of each single HAP and total HAP for each month in the reporting period.

$$HAP_A = \sum_{x=1}^x [U_x(1 - C_{Conx})] + \sum_{z=1}^z U_z + F$$

Where:

HAP_A	=	Total plantwide emissions of an individual HAP (A)
U_x	=	Uncontrolled HAP emission from each Emission Point (x)
C_{Conx}	=	Control Efficiency of each control device for each Emission Point (x)
U_z	=	Uncontrolled HAP emissions from each uncontrolled Emission Point (z) during bypass events
F	=	Total plantwide fugitive HAP emissions

- iii. The owner or operator must determine the sum of metal HAP emissions from all metal HAP process vents within a CMPU subject to 40 CFR 63 Subpart VVVVVV, except you are not required to determine the annual emissions if you control the metal HAP process vents within a CMPU in accordance with Table 4 of Subpart VVVVVV or if you determine your total metal HAP usage in the process unit is less than 400 lb/yr. To determine the mass emission rate you may use process knowledge, engineering assessment, or test data. You must keep records of the emissions calculations. [40 CFR 63.11496(f)(1)]
- iv. If your current estimate is that total uncontrolled metal HAP emissions from a CMPU subject to this subpart are less than 400 lb/yr, then you must keep records of either the number of batches operated per month (batch vents) or the process operating hours (continuous vents). Also, you must reevaluate your total emissions before you make any process or operational change that affects emissions of metal HAP. If projected emissions increase to 400 lb/yr or more, then you must be in compliance with one of the options for metal HAP process vents in Table 4 of Subpart VVVVVV upon initiating operation under the new operating conditions. You must keep

records of all recalculated emissions determinations.
[40 CFR 63.11496(f)(2)]

b. NO_x

- i. The owner or operator shall calculate and record the plantwide consecutive 12-month NO_x emissions for each month in the reporting period.

$$\text{NO}_x = \sum_{1}^x [U_x(1 - C_{\text{Conx}})] + \sum_{1}^z U_z + F$$

Where:

NO _x	=	Total plantwide emissions of NO _x
U _x	=	Uncontrolled NO _x emission from each Emission Point (x)
C _{Conx}	=	Control Efficiency of each control device for each Emission Point (x)
U _z	=	Uncontrolled NO _x emissions from each uncontrolled Emission Point (z) during bypass events
F	=	Total plantwide fugitive NO _x emissions

c. Opacity

- i. For each referenced PM emission point, the owner or operator shall conduct a monthly one-minute visible emissions survey during normal process operation and daylight hours of each PM emission point. No more than four emission points shall be observed simultaneously. The opacity surveys can be performed on the building exhaust points if the process is wholly within a building.
- ii. At emission points where visible emissions are observed, the owner or operator shall initiate corrective action within eight hours of the initial observation. If the visible emissions persist, the owner or operator shall perform or cause to be performed a Method 9 within 24 hours of the initial observation.
- iii. The owner or operator shall maintain monthly records of the results of all visible emissions surveys and Methods 9 tests performed. The records shall include the date of each survey, the name of the person conducting the survey, whether or not visible emissions were observed, and what if any corrective action was performed. If an emission point is not being operated during a given month, then no visible emission survey needs to be performed and a negative declaration shall be entered in the record.

d. PM/PM₁₀/PM_{2.5}

- i. For each PM emission point, the owner or operator shall monitor and maintain records of the throughput of each raw material during each calendar month.

- ii. The owner or operator shall calculate and record the plantwide consecutive 12-month PM₁₀/PM_{2.5} emissions for each month in the reporting period.

$$\text{PM/PM}_{10}/\text{PM}_{2.5} = \sum_1^x [U_x(1 - C_{\text{Conx}})] + \sum_1^z U_z + F$$

Where:

PM/PM ₁₀ /PM _{2.5}	=	Total plantwide emissions of PM/PM ₁₀ /PM _{2.5}
U _x	=	Uncontrolled PM emission from each Emission Point (x)
C _{Conx}	=	Control Efficiency of each control device for each Emission Point (x)
U _z	=	Uncontrolled PM/PM ₁₀ /PM _{2.5} emissions from each uncontrolled Emission Point (z) during bypass events
F	=	Total plantwide fugitive PM/PM ₁₀ /PM _{2.5} emissions

e. TAC

The owner or operator shall maintain records sufficient to demonstrate environmental acceptability, including, but not limited to, SDS, analysis of emissions, and/or modeling results.

f. VOC

- i. For each VOC emission point, the owner or operator shall monitor and maintain records of the throughput of acetic acid and any other VOC containing materials during each calendar month.
- ii. The owner or operator shall calculate and record the plantwide consecutive 12-month VOC emissions for each month in the reporting period.

$$\text{VOC} = \sum_1^x [U_x(1 - C_{\text{Conx}})] + \sum_1^z U_z + F$$

Where:

VOC	=	Total plantwide emissions of VOC
U _x	=	Uncontrolled VOC emission from each Emission Point (x)
C _{Conx}	=	Control Efficiency of each control device for each Emission Point (x)
U _z	=	Uncontrolled VOC emissions from each uncontrolled Emission Point (z) during bypass events
F	=	Total plantwide fugitive VOC emissions

S3. Reporting
[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall

clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11.

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 st through June 30 th	August 29 th
July 1 st through December 31 st	March 1 st

a. HAP

- i. The owner or operator shall report the consecutive 12-month plantwide emissions of each individual HAP for each month in the reporting period.
- ii. The owner or operator shall report the consecutive 12-month plantwide emissions of total HAP for each month in the reporting period.
- iii. Semiannual Compliance Reports. The owner or operator must submit semiannual compliance reports that contain the information specified in the following paragraphs, as applicable. Reports are required only for semiannual periods during which you experienced any of the events described in § 63.11501(d)(1) through (8). [40 CFR 63.11501(d)]
 - (1) Deviations. You must clearly identify any deviation from the requirements of this subpart. [§63.11501(d)(1)]
 - (2) Delay of leak repair. You must provide the following information for each delay of leak repair beyond 15 days for any process equipment, storage tank, surge control vessel, bottoms receiver, and each delay of leak repair beyond 45 days for any heat exchange system with a cooling water flow rate less than 8,000 gal/min: information on the date the leak was identified, the reason for the delay in repair, and the date the leak was repaired. [§63.11501(d)(3)]
 - (3) Process change. You must report each process change that affects a compliance determination and submit a new certification of compliance with the applicable requirements in accordance with the procedures specified in §63.11501(b). [§63.11501(d)(4)]
 - (4) Overlapping rule requirements. Report any changes in the overlapping provisions with which you comply. [§63.11501(d)(6)]
 - (5) Malfunctions. If a malfunction occurred during the reporting period, the report must include the number of instances of malfunctions that caused emissions in excess of a standard. For each malfunction that

caused emissions in excess of a standard, the report must include a list of the affected sources or equipment, an estimate of the volume of each regulated pollutant emitted over the standard, and a description of the method used to estimate the emissions. The report must also include a description of actions you took during a malfunction of an affected source to minimize emissions in accordance with §63.11495(d), including actions taken to correct a malfunction. [§63.11501(d)(8)]

b. Opacity

- i. The date and time of each VE Survey where visible emissions were observed, and the results of the Method 9 test performed;
- ii. Identification of all periods of exceeding the opacity standard;
- iii. Description of any corrective action taken for each exceedance of an opacity standard specified in this permit; and
- iv. Any deviation from the requirement to perform or record the results of the required monthly VE surveys or Method 9 tests.

c. PM/PM₁₀/PM_{2.5}, NO_x and VOC

The owner or operator shall report the plantwide consecutive 12-month emissions of all air pollutants for each month in the reporting period.

d. TAC

Any conditions that were inconsistent with those conditions analyzed in the most recent Environmental Acceptability Demonstration.

S4. Testing

[Regulation 2.03, section 6.1]

a. HAP

- i. For an existing source subject to the HAP metals emission limits specified in Table 4 of Subpart VVVVVV, you must comply with the initial compliance and monitoring requirements in §63.11496(f)(3)(i) through (iii). You must keep records of monitoring results to demonstrate continuous compliance. [40 CFR 63.11496(f)(3)]
- ii. You must prepare a monitoring plan containing the information in §63.11496(f)(3)(i)(A) through (E). The plan must be maintained on-site and be available on request. You must operate and maintain the control device according to a site-specific monitoring plan at all times. [40 CFR 63.11496(f)(3)(i)]

- 1) A description of the device; [40 CFR 63.11496(f)(3)(i)(A)]
 - 2) Results of a performance test or engineering assessment verifying the performance of the device for reducing HAP metals or particulate matter (PM) to the levels required by this subpart; [40 CFR 63.11496(f)(3)(i)(B)]
 - 3) Operation and maintenance plan for the control device (including a preventative maintenance schedule consistent with the manufacturer's instructions for routine and long-term maintenance) and continuous monitoring system (CMS). [40 CFR 63.11496(f)(3)(i)(C)]
 - 4) A list of operating parameters that will be monitored to maintain continuous compliance with the applicable emissions limits; and [40 CFR 63.11496(f)(3)(i)(D)]
 - 5) Operating parameter limits based on either monitoring data collected during the performance test or established in the engineering assessment. [40 CFR 63.11496(f)(3)(i)(E)]
- iii. You must conduct a performance test or an engineering assessment for each CMPU subject to a HAP metals emissions limit in Table 4 to 40 CFR 63 Subpart VVVVVV and report the results in your Notification of Compliance Status (NOCS). Each performance test or engineering assessment must be conducted under representative operating conditions, and sampling for each performance test must be conducted at both the inlet and outlet of the control device. Upon request, you shall make available to the District such records as may be necessary to determine the conditions of performance tests. If you own or operate an existing affected source, you are not required to conduct a performance test if a prior performance test was conducted within the 5 years prior to the effective date using the same methods specified in §63.11496(f)(3)(iii)), and, either no process changes have been made since the test, or, if you can demonstrate that the results of the performance test, with or without adjustments, reliably demonstrate compliance despite process changes. [40 CFR 63.11496(f)(3)(ii)]
- iv. If you elect to conduct a performance test, it must be conducted according to requirements in §63.11410(j)(1). As an alternative to conducting a performance test using Method 5 or 5D to determine the concentration of PM, you may use Method 29 in 40 CFR 60, appendix A-8 to determine the concentration of HAP metals. You have demonstrated initial compliance if the overall reduction of either HAP metals or total PM is equal to or greater than 95 percent. [40 CFR 63.11496(f)(3)(iii)]

Plantwide Comments

- Clariant Corp. – Louisville West Plant emits the following TACs subject to the STAR program (Regulations 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23): ammonia (NH₃), cobalt and cobalt compounds (Co), chromium^{trivalent} and chromium compounds (Cr(III)), chromium^{hexavalent} and chromium compounds (Cr(VI)), copper and copper compounds (Cu), hydrochloric acid (hydrogen chloride (HCl)), manganese and manganese compounds (Mn), nickel and nickel compounds (Ni), nitric acid (HNO₃), sulfuric acid (H₂SO₄), and triethylamine. The emissions from many emission units are de minimis with control devices, resulting in the requirement to operate the control devices to maintain the de minimis status of those emission units. The risks for all processes of 0.613 and 2.28 (industrial property) are less than the goals of 7.5 and 75.0 (industrial property). The risks for new processes of 0.568 and 2.15 (industrial property) are less than the goals of 3.8 and 38.0 (industrial property), respectively. The highest hazard quotients (HQ), for copper, of 0.502 and 0.529 (industrial property) are less than the goals of 1.0 and 3.0, respectively.

At the time of permit issuance, the de minimis values are as follows.

Pollutant	De Minimis		Averaging	Category
	lb/hr	lb/avg.	Period	
Trivalent chromium and chromium compounds (Cr(III))	0.1	0.1	8-hour	1
Hexavalent chromium and chromium compounds (Cr(VI))	0.000045	0.04	Annual	1
Nickel and nickel compounds (Ni)	0.0021	1.82	Annual	1
Ammonia	54.00	48,000	Annual	2
Cobalt and cobalt compounds (Co)	0.00022	0.19	Annual	2
Copper and copper compounds (Cu)	0.04	0.047	8-hour	2
Hydrochloric acid (HCl)	10.80	9,600	Annual	2
Manganese and manganese compounds (Mn)	0.027	24.00	Annual	2
Nitric acid (HNO ₃)	1.00	1.00	8-hour	2
Sulfuric acid (H ₂ SO ₄)	0.54	480.00	Annual	2
Triethylamine	3.78	3,360	Annual	4

The carcinogen risk and non-carcinogen risk values comply with the STAR EA goals required in Regulation 5.21.

EU	EP	TAC	Risk		HQ	
			Unadjusted (Process $EAG_C \leq 1.0$)	Industrial (Process $EAG_C \leq 10.0$)	Unadjusted (Process $EAG_{NC} \leq 1.0$)	Industrial (Process $EAG_{NC} \leq 3.0$)
W03	H-201-W03-465/COM-201-W03-465/M-201-W03-465	Cu	--	--	0.115	0.12
		Ni	0.063	0.065	0.017	0.018
	H-201-W03-462	Cu	--	--	0.057	0.059
	H-201-W03-470	Cu	--	--	0.057	0.059
	TM-201-W03-470	Cu	--	--	0.061	0.063
W03	PD-201-W03-475/ PD-201-W03-476	Cu	--	--	0.061	0.063
W07/ W23	T-201-W07-505, HT-203-W23-534, HT-203-W23-542	HNO ₃	--	--	0.36	0.36
W09	DD-201-W09-001/ H-201-W09-001	Cu	--	--	0.10	0.106
W12	SD-201-W12-230	Cu	--	--	0.150	0.165
	SD-201-W12-230	Mn	--	--	0.048	0.053
W55	HT-250-W55-801	Cr(VI)	0.730	1.270	0.0076	0.013
	HT-250-W55-801B	Cr(VI)	0.220	0.410	0.0023	0.0042
	HT-250-W55-701	Cr(VI)	0.079	0.140	0.00082	0.0014
	FD-250-W55-702	Cr(VI)	0.079	0.140	0.00082	0.0014
	FD-250-W55-703	Cr(VI)	0.079	0.140	0.00082	0.0014
	H-250-W55-801	Cr(VI)	0.046	0.130	0.00047	0.0014
Plantwide R_C (All Processes):			1.30	2.28	--	--
Plantwide R_C (New Processes)¹:			1.09	1.88	--	--
Highest Plantwide HQ for single TAC (copper):					0.602	0.636

2. The PM control efficiencies for baghouses used by Clariant are based on the following stack tests. The control efficiency for PM is also used for PM TACs/HAPs: hexavalent chromium and chromium compounds (Cr(VI)), trivalent chromium and chromium compounds (Cr(III)), nickel and nickel compounds (Ni), ammonia (NH₃), cobalt and cobalt compounds (Co), copper and copper compounds (Cu), hydrochloric acid (hydrogen chloride) (HCl), manganese and manganese compounds (Mn), nitric acid (HNO₃), sulfuric acid (H₂SO₄), antimony and antimony compounds (Sb) and radon and other radionuclides (U).

¹ New processes include H-201-W03-465/COM-201-W03-465/M-201-W03-465, H-201-W03-462, H-201-W03-470, PA-201-W03-490, TM-201-W03-470, T-201-W07-505/HT-203-W23-534/HT-203-W23-542, HT-250-W55-801, HT-250-W55-801B, and HT-250-W55-701.

Bag Type	Control Efficiency	Tested Control Device	Test Date
MAC 80/20	99.8%	DC-203-W25-128	May 4, 2021, reported July 1, 2021
Mott tubes	99.96%	DC-101-S16-117	Oct. 8, 2020, reported Nov. 9, 2020
Nomex	99.8%	DC-201-W12-250	May 5, 2021, reported July 1, 2021
Polyester	99.6%	DC-101-S15-112	May 6, 2021, reported July 1, 2021
Torit UltraWeb Cartridge	99.7%	DC-201-W03-500	July 22, 2020, reported Oct. 1, 2020
DC-204-W36-001	92.8%	DC-204-W36-001	July 21, 2020, reported Oct. 1, 2020

All other baghouses are assumed to have a 95% control efficiency.

HEPA filters are assumed to have a 99.97% control efficiency, based upon manufacturer's certification.

Emission Unit 201-W02: Sodium aluminate and sodium carbonate tanks**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

Equipment: 201-W02 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
T-201-W02-003	Sodium carbonate tank	New	7.08	NA	Fugitive

There are no control devices in EU 201-W02.

201-W02 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Opacity

See Plantwide Specific Conditions.

b. PM/PM₁₀/PM_{2.5}

- i. For T-201-W02-002, the owner or operator shall not allow or cause PM emissions to exceed 2.34 lb/hr. [Regulation 7.08, section 3.1.2]²
- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Opacity

See Plantwide Specific Conditions.

b. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

² The potential uncontrolled hourly PM emissions are below the applicable emission standard in Regulation 7.08.

The compliance reports are due on or before the following dates of each calendar year:

Reporting Period

January 1 through June 30

July 1 through December 31

Report Due Date

August 29

March 1 of the following year

a. Opacity

See Plantwide Specific Conditions.

b. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

Emission Unit 201-W03: Copper Zinc Tabletting**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 201-W03 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
H-201-W03-465/COM-201-W03-465/M-201-W03-465	Compactor System (Compact Hopper, Compactor and Compactor Mills)	2005	7.08, STAR, 40 CFR 63 VVVVVV	DC-201-W03-500	S-201-W10-003
TM-201-W03-470 ³	Tabletting Machine	2019			
PD-201-W03-475/ PD-201-W03-476	Product Drums	2019			

³ Tabletting machine has been replaced per 02/02/2021 application. The new rate is 500 lbs/hr. Emission unit subsequently modified by 08/24/2021 application.

Control Devices

Control ID	Description
DC-201-W03-500	Donaldson (99.7%), Model Torit Downflo II 3-24 [Torit UltraWeb Cartridge type]

201-W03 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP TM-201-W03-470 and PD-201-W03-475/PD-201-W03-476, the owner or operator shall operate and maintain the control device DC-201-W03-500 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

i. For H-201-W03-465/COM-201-W03-465/M-201-W03-465, TM-201-W03-470 and PD-201-W03-475/PD-201-W03-476, the owner or operator shall not allow or cause PM emissions to exceed 2.34 lb/hr, each. [Regulation 7.08, section 3.1.2]⁴

ii. See Plantwide Specific Conditions.

e. TAC

i. The owner or operator shall not allow manganese or nickel emissions to exceed de minimis levels from TM-201-W03-470 and PD-201-W03-475/PD-201-W03-476. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. The owner or operator shall not allow the TAC emissions to exceed the levels in the table below. (See Comment 1.)

EP	Pollutant	Emission Limit (lb/12-consecutive months) ⁵
H-201-W03-465/COM-201-W03-465/M-201-W03-465	Copper	103.03

⁴ The potential controlled emissions do not exceed the emission limit.

⁵ For EP TM-201-W03-470 and PD-201-W03-475/PD-201-W03-476, the facility modeled 6.27E-03 lb/hr copper emissions using SCREEN3 (each).

EP	Pollutant	Emission Limit (lb/12-consecutive months) ⁵
H-201-W03-465/COM-201-W03-465/M-201-W03-465	Nickel	2.37
H-201-W03-462	Copper	51.52
H-201-W03-470	Copper	51.52
TM-201-W03-470	Copper	54.95
PD-201-W03-475/PD-201-W03-476	Copper	54.95

iii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping [Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-201-W03-500 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-201-W03-500	0.05 – 7.0

- iii. For any period of operating outside the established performance indicator range for DC-201-W03-500, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. HAP

See Plantwide Specific Conditions

c. Opacity

There are no monitoring or recordkeeping requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. The owner or operator shall monitor and record the consecutive 12-month copper emissions from EP H-201-W03-465/COM-201-W03-465/M-201-W03-465, H-201-W03-465/COM-201-W03-465/M-201-W03-465, H-201-W03-462, H-201-W03-470, TM-201-W03-470, and PD-201-W03-475/PD-201-W03-476 and nickel emissions from EP H-201-W03-465/COM-201-W03-465/M-201-W03-465 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.
- iii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no reporting requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. The consecutive 12-month copper emissions from EP H-201-W03-465/COM-201-W03-465/M-201-W03-465, H-201-W03-465/COM-201-W03-465/M-201-W03-465, H-201-W03-462, H-201-W03-470, TM-201-W03-470, and PD-201-W03-475/PD-201-W03-476 and nickel emissions from EP H-201-W03-465/COM-201-W03-465/M-201-W03-465 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.
- iii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

201-W03 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.⁶

EP	Cu	Mn	Ni
H-201-W03-465/COM-201-W03-465/M-201-W03-465	Over de minimis	1 st	Over de minimis
H-201-W03-462	Over de minimis	1 st	1 st
H-201-W03-470	Over de minimis	1 st	1 st
TM-201-W03-470	Over de minimis	1 st	1 st
PD-201-W03-475/PD-201-W03-476	Over de minimis	1 st	1 st

⁶ For emission points over de minimis, the company provided SCREEN3 modeling on 12/4/2020 which meets the EA goals.

Emission Unit 201-W05: First Chemical Manufacturing**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

Equipment: 201-W05 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
MX-201-W05-102 ⁷	Sigma mixer	1998	7.08	NA	S-201-W05-005
MX-201-W05-103 ⁷	Sigma mixer	1998		NA	
T-201-W05-102 ⁸	Precipitator Tank	1998		FR-201-W05-102 FIL-201-W05-102	S-201-W05-003

Control Devices

Control ID	Description
FR-201-W05-102	Bin Vent Polyester Filter (99.6%), Macawber Engineering, Model SP1170-304SS [Polyester type]
FIL-201-W05-102	Cartridge Filter (95%), Vac-U-Max

⁷ Powder raw materials will now be processed in the W05 sigma mixers per application sent in 2/2/2021. Products will be limited to wet products or dry powders with no TACs/HAPs.

⁸ Control device ED-201-W05-108 was replaced for this tank.

U201-W05 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP T-201-W05-102, the owner or operator shall operate and maintain the control devices FR-201-W05-102 and FIL-201-W05-102 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice to meet the standards. [Regulations 2.05, Regulation 7.08 section 3.1.2]⁹

b. Opacity

See Plantwide Specific Conditions.

c. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow the processing rate from MX-201-W05-102 and MX-201-W05-103 to equal or exceed 220 lbs/hr.
- ii. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
201-W05 ¹⁰	MX-201-W05-102 and MX-201-W05-103	2.34 each
	T-201-W05-102	3.70

- iii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of FR-201-W05-102 and FIL-201-W05-102 for signs of damage, air leakage, corrosion, or other equipment defects,

⁹ Clariant does not process dry powders containing HAPs/TACs in this Emission Unit.

¹⁰ The potential uncontrolled emissions from MX-201-W05-102 and MX-201-W05-103 do not exceed the emission limit. The potential controlled emissions from T-201-W05-102 do not exceed the emission limit after the first control device.

and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.

- i. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
FIL-201-W05-102	1.0 – 6.0

- ii. For any period of operating outside the established performance indicator range for FIL-201-W05-102, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iii. See Plantwide Specific Conditions

b. Opacity

There are no monitoring or record keeping requirements for this pollutant.

c. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number,

and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operations

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements for this pollutant.

c. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

Emission Unit 201-W09: Material Transfer and #3 Rotary Calciner**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
6.09	Standards of Performance for Existing Process Operations	1 through 3 and 5

Equipment: 201-W09

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
DD-201-W09-001/ H-201-W09-001	Drum Dumper / Feed Hopper	1966	6.09, STAR	DC-201- W09-001	S-201- W09-002
PD-201-W09-001	Product Drum	1966			

Control Devices

Control ID	Description
DC-201-W09-001	MAC 80/20 (99.8%), MAC Equipment Inc., Model 3MTF6 [MAC 80/20 type]

U201-W09 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP DD-201-W09-001/H-201-W09-001 and PD-201-W09-001, the owner or operator shall operate and maintain DC-201-W09-001 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice to meet the standards. [Regulations 2.05, 7.08, section 3.1.2, 5.21]

b. Opacity

See Plantwide Specific Conditions.

c. PM/PM₁₀/PM_{2.5}

i. For DD-201-W09-001/H-201-W09-001 and PD-201-W09-001, the owner or operator shall not allow or cause PM emissions to exceed 2.58 lb/hr, each. [Regulation 6.09, section 3.1.2]¹¹

ii. See Plantwide Specific Conditions.

d. TAC

i. The owner or operator shall not allow copper emissions to exceed de minimis levels from PD-201-W09-001. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. The owner or operator shall not allow copper emissions to exceed 84.01 lb/12-consecutive month period from DD-201-W09-001/H-201-W09-001. [Regulation 5.21, section 4.3] (See Comment 1.)

iii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

¹¹ The potential controlled emissions from DD-201-W09-001/H-201-W09-001 do not exceed the emission limit after the first control device, and the potential uncontrolled emissions from PD-201-W09-001 do not exceed the emission limit.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-201-W09-001 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-201-W09-001	0.5 – 10.0

- iii. For any period of operating outside the established performance indicator range for DC-201-W09-001 the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. HAP

- i. See Plantwide Specific Conditions

c. Opacity

- i. There are no monitoring or recordkeeping requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and

- (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. The owner or operator shall monitor and record the consecutive 12-month copper emissions from DD-201-W09-001/H-201-W09-001 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.
- iii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.

- (1) The date,
- (2) The observed performance indicator value, and
- (3) Corrective action taken to minimize the extent of the excursion, and
- (4) Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no reporting requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. The consecutive 12-month copper emissions from DD-201-W09-001/H-201-W09-001 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.
- iii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

201-W09 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.¹²

EP	Cu
DD-201-W09-001/ H-201-W09-001	Over de minimis
PD-201-W09-001	1 st

¹² For emission points over de minimis, the company provided SCREEN3 modeling on 02/22/2022 which meets the EA goals.

Emission Unit 201-W11: #1 Spray Dryer and Slurry Manufacturing**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
6.09	Standards of Performance for Existing Process Operations	1 through 3
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 201-W11¹³

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
T-201-W11-002	Mixing tank	1990	7.08	DC-201-W17-001	S-201- W17-001
T-201-W11-005	Mixing tank	1990	7.08		
DD-201-W11-110/ T-201-W11-110	Drum dumper/tank	1965	6.09		
T-201-W11-006	Nitric acid pot	1990	STAR	NA	Fugitive

¹³ T-201-W11-002, T-201-W11-005, and T-201-W11-006 are being moved from EU U17. PD-201-W11-001 is being permitted to allow TAC emissions.

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
SD-201-W11-130 ¹⁴ and SD-201-W11-130A	#1 Spray Dryer (83.99%), 6 MMBTU/hr	2016	7.08, STAR, 40 CFR 63 VVVVVV	SEP-201-W11-140 DC-201-W11-150	S-201-W11-001
	#1 Spray Dryer (83.99%), 6 MMBTU/hr, product A			SEP-201-W11-140 SEP-201-W12-145 ED-201-W12-270 SC-201-W12-275	S-201-W11-004
PD-201-W11-001	Product drum	1965	7.08, STAR, 40 CFR 63 VVVVVV	DC-201-W11-150	S-201-W11-001

Control Devices

Control ID	Description
DC-201-W17-001	Baghouse (99.7%), Donaldson Torit DFT2-12 [Torit UltraWeb Cartridge type]
DC-201-W11-150	Baghouse (99.8%), Aeropulse, Model 216-8-20 [Nomex type]
SEP-201-W11-140	Cyclone (75%), G.H. Hicks
SEP-201-W11-145	Cyclone (97.654%), Fisher-Klosterman Emtrol, Model XQ-120-16
ED-201-W12-270	Eductor (95%), Schutte & Koerting, Model 7010
SC-201-W12-275	Scrubber (95% PM, 75% VOC), WW Sly, Model 240 Impinjet Packed Tower Scrubber

¹⁴ SD-201-W11-130 does not generate TACs, per the application dated 6/7/2016.

U201-W11 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP T-201-W11-002, T-201-W11-005, PD-201-W11-001, and SD-201-W11-130A, the owner or operator shall operate and maintain the control devices DC-201-W17-001, DC-201-W11-150, SEP-201-W11-140, SEP-201-W11-145, ED-201-W12-270, and SC-201-W12-275 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions

d. PM/PM₁₀/PM_{2.5}

- i. For DD-201-W11-110/T-201-W11-110, the owner or operator shall not allow or cause PM emissions to exceed 9.94 lb/hr.
[Regulation 6.09, section 3.2]¹⁵
- ii. For T-201-W11-002, T-201-W11-005, PD-201-W11-001, the owner or operator shall not allow or cause PM emissions to exceed 2.34 lb/hr, each.
[Regulation 7.08, section 3.1.2]¹⁶
- iii. For SD-201-W11-130/SD-201-W11-130A, the owner or operator shall not allow or cause PM emissions to exceed 2.62 lb/hr.
[Regulation 7.08, section 3.1.2]¹⁷
- iv. See Plantwide Specific Conditions.

¹⁵ The potential controlled emissions do not exceed the emission limit after the first control device.

¹⁶ The potential controlled emissions from T-201-W11-002 and T-201-W11-005 do not exceed the emission limit after the first control device. The potential uncontrolled emissions PD-201-W11-001 do not exceed the emission limit.

¹⁷ The potential controlled emissions do not exceed the emission limit after the third control device.

e. TAC

- i. For SD-201-W11-130A and PD-201-W11-001, the owner or operator shall not allow emissions of chromium(III), manganese, or nickel to exceed de minimis levels. [Regulations 5.00 and 5.21] (See Comment 1.)
- ii. For T-201-W11-006, the owner or operator shall not allow nitric acid emissions to exceed de minimis levels. [Regulations 5.00 and 5.21] (See Comment 1.)
- iii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-201-W17-001 and DC-201-W11-150, SEP-201-W11-140, SEP-201-W11-145, ED-201-W12-270, and SC-201-W12-275 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-201-W11-150	1.0 – 7.0
DC-201-W17-001	0.5 – 10.0
SC-201-W12-275	5.0 – 15.0

- iii. The owner or operator shall monitor and record the inlet water pressure/flowrate at least once during each operating day to ensure they are maintained within the operating ranges as shown in the table below.

Control ID	Inlet Water Pressure/ Flowrate	Makeup Rate (gpm)
ED-201-W12-270	≥ 40 psi	3 – 15
SC-201-W12-275	3 – 15 gpm	NA

- iv. For any period of operating outside the established performance indicator range for DC-201-W11-150, DC-201-W17-001, ED-201-W12-270, and/or SC-201-W12-275, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- v. See Plantwide Specific Conditions.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no monitoring or recordkeeping requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;

- (3) The emissions of each TAC (lb/hr and lb/avg. period);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

f. VOC

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no reporting requirements for the emission unit.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

f. VOC

See Plantwide Specific Conditions.

201-W11 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

EU	EP	HNO ₃	Cr(III)	Mn	Ni
201-W11	PD-201-W11-001	--	unc.	unc.	1 st
	T-201-W11-006	unc.	--	--	--
	SD-201-W11-130A	--	2 nd	3 rd	3 rd

-- This emission point has no emissions of the specified TAC.

Emission Unit 201-W12 and 201-W17: #2 Spray Dryer and Slurry Manufacturing

Emission Unit 201-W12: #2 Spray Dryer; Spray drying of slurries of metal oxides

201-W17: Slurry Manufacturing; mixing, reacting, and grinding of powders and metal salts with acids in a water slurry**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 201-W12 Emission Point¹⁸

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
201-W12					
SD-201-W12-230b	Spray Dryer	1966	7.08, STAR, 40 CFR 63 VVVVVV	SEP-201-W12-240 SEP-201-W12-260 DC-201-W12-250	S-101-W12-002
PD-201-W12-002	Cyclone Fines Drum	1966		DC-201-W12-250	S-101-W12-002
201-W17					
FR-201-W17-001 ¹⁹	Filter Receiver (99.8%) [MAC 80/20] Mixing Tank, 2500 lb/hr	2006	7.08	NA	S-201-W17-003

Control Devices

Control ID	Description
SEP-201-W12-240/ SEP-201-W12-260	One (1) Cyclone, G.H. Hicks and One (1) Power Cyclone, Aerodyne Development Co. Power Cyclone 6000, in series (94.6%, based on stack test performed May 5, 2021, and reported July 1, 2021, utilizing the production rate (429 lb/hr) for this spray dryer and the DC-201-W12-250 inlet rate (23.2 lb/hr), as described in the List of Representative Devices for Stack Test document, submitted April 8, 2020)
DC-201-W12-250	Baghouse (99.8%), MikroPul, Model Unknown [Nomex type]

¹⁸ Nickel products are no longer processed in this emission unit per application sent in on 2/2/2021.

¹⁹ This equipment does not have a control device, per the application submitted on 08/26/2022.

201-W12 Specific Conditions

S2. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

- i. For EP SD-201-W12-230b and PD-201-W12-002, the owner or operator shall operate and maintain the control devices SEP-201-W12-240, SEP-201-W12-260, and DC-201-W12-250 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]
- ii. The owner or operator shall not allow the production rate from SD-201-W12-230b to exceed 500 lb/hr. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
201-W12 ²⁰	SD-201-W12-230b and PD-201-W12-002	2.34 each
201-W17	FR-201-W17-001	2.52

- ii. See Plantwide Specific Conditions.

²⁰ The potential controlled emissions from SD-201-W12-230b do not exceed the emission limit after the second control device. The potential uncontrolled emissions from PD-201-W12-002 and FR-201-W17-001 do not exceed the emission limit.

e. TAC

- i. For SD-201-W12-230b, the owner or operator shall not allow copper emissions to exceed 199.95 pounds per 12-consecutive month period. [Regulations 5.00 and 5.21]²¹ (See Comment 1.)
- ii. For SD-201-W12-230b, the owner or operator shall not allow manganese emissions to exceed 35.48 pounds per 12-consecutive month period. [Regulations 5.00 and 5.21]²² (See Comment 1.)
- iii. For PD-201-W12-002, the owner or operator shall not allow copper or manganese emissions to exceed de minimis levels. [Regulations 5.00 and 5.21] (See Comment 1.)
- iv. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of SEP-201-W12-240, SEP-201-W12-260, and DC-201-W12-250 signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-201-W12-250	1.0 – 7.0

- iii. For any period of operating outside the established performance indicator range for DC-201-W12-250 the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and

²¹ The facility modeled 0.023 lb/hr copper controlled in the SCREEN 3 (tier 3) model dated July 1, 2021.

²² The facility modeled 4.05E-03 lb/hr manganese controlled in the SCREEN 3 (tier 3) model dated July 1, 2021.

(4) Measures implemented to prevent reoccurrence.

ii. The owner or operator shall monitor and record the production rate from SD-201-W12-230b.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

i. See Plantwide Specific Conditions

ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

e. TAC

i. The owner or operator shall monitor and record the monthly and consecutive 12-month emissions of copper and manganese from EP SD-201-W12-230b for each month in the reporting period.

ii. See Plantwide Specific Conditions.

iii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of each TAC (lb/hr and lb/avg. period);

- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.

- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. The monthly and consecutive 12-month emissions of copper and manganese from EP SD-201-W12-230b for each month in the reporting period.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

201-W12 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

EU	EP	Cu	Mn
201-W12	PD-201-W12-002	1 st	unc.
	SD-201-W12-230	Over de minimis	Over de minimis

Emission Unit 201-W14: Reactors**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 201-W14 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
T-201-W14-002	Large Scale Tank	1990	7.08	NA	Fugitive
T-201-W14-004 ²³	Specialty Reactor	1990	STAR	ED-201-W14-590 V-201-W14-595	S-201-W14-004 S-201-W14-001
T-201-W14-005	Pre-Mix Tank	1990	7.08	NA	Fugitive

Control Devices

Control ID	Description
ED-201-W14-590	Eductor T-002 (75%), Schutte & Koerting Model 7014 L
V-201-W14-595	Two-stage packed column wet scrubber (75% / 2 stages)

²³ Equipment was previously named T-201-W14-003. Per application sent in 2/2/2021, the tank no longer processes powder products and ammonia. It will no longer be permitted for PM, manganese, or ammonia.

201-W14 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP T-201-W14-004, the owner or operator shall operate and maintain the control devices, ED-201-W14-590 and V-201-W14-595, at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, and Regulation 7.08 section 3.1.2]

b. Opacity

See Plantwide Specific Conditions.

c. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
201-W14 ²⁴	T-201-W14-002	2.34
	T-201-W14-005	3.59

- ii. See Plantwide Specific Conditions.

d. TAC

- i. See Plantwide Specific Conditions.
- ii. For T-201-W14-004, the owner or operator shall not allow nitric acid emissions to exceed de minimis levels. [Regulations 5.00 and 5.21] (See Comment 1.)

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

²⁴ The equipment does not exceed their respective PM emission limits uncontrolled.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of ED-201-W14-590 and V-201-W14-595 signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the inlet water flowrate/pressure at least once during each operating day to ensure it is maintained within the operating ranges as shown in the table below.

Control ID	Inlet Water Pressure/Flowrate	Makeup Rate (gpm)/Line Density Measurement (spg)
ED-201-W14-590	≥ 60 psi	≤ 1.3039 spg
V-201-W14-595	≥ 20 psi (Stage 1) ≥ 10 psi (Dilute stage)	0.5 – 10.0 gpm

- iii. For any period of operating outside the established performance indicator range for ED-201-W14-590 and V-201-W14-595, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number,

and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
- (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements for the emission unit.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

201-W14 Comments

2. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

EU	EP	HNO ₃
201-W14	T-201-W14-004	uncontrolled

Emission Unit 203-W18: Screening System; Four product screening systems and a repack station ²⁵

Applicable Regulations

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
6.09	Standards of Performance for Existing Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	See Plantwide Specific Conditions

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 203-W18 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
DD-202-W18-001	Drum Dumper 1	1967	6.09, STAR, 40 CFR 63 VVVVVV	DC-202-W18-001 DC-202-W18-005 FIL-202-W18-001	S-202-W18-001
H-202-W18-001	Hopper 1				
FD-202-W18-001	Feeder 1				
VS-202-W18-001	Screener 1				
PD-202-W18-001	Product Drum 1				
DD-202-W18-002	Drum Dumper 2	1967	6.09, STAR, 40 CFR 63 VVVVVV	DC-202-W18-002 DC-202-W18-005 FIL-202-W18-001	S-202-W18-001
H-202-W18-002	Hopper 2				
BD-202-W18-002	Big Bagger 2				

²⁵ This emission unit is included in this construction permit due to the addition of copper emissions.

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
DD-202-W18-003	Drum Dumper 3	1967	6.09, STAR, 40 CFR 63 VVVVVV	DC-202-W18-003 DC-202-W18-005 FIL-202-W18-001	S-202-W18-001
H-202-W18-003	Hopper 3				
FD-202-W18-003	Feeder 3				
VS-202-W18-003	Screener 3				
PD-202-W18-003	Product Drum 3				
DD-202-W18-004	Drum Dumper 4	1967	6.09, STAR, 40 CFR 63 VVVVVV	DC-202-W18-004 DC-202-W18-005 FIL-202-W18-001	S-202-W18-001
H-202-W18-004	Hopper 4				
FD-202-W18-004	Feeder 4				
VS-202-W18-004	Screener 4				
PD-202-W18-004	Product Drum 4	1975	6.09, STAR, 40 CFR 63 VVVVVV	DC-202-W18-004 DC-202-W18-005 FIL-202-W18-001	S-202-W18-001
DD-202-W18-005	Drum Dumper 5				
H-202-W18-005	Hopper 5				
VS-202-W18-005	Screener 5				
FD-202-W18-005	Feeder 5				
PD-202-W18-005	Product Drum 5				

Control Devices

Control ID	Description
DC-202-W18-001	Baghouse 201, Torit, Model DFT-2-8, 2008 [Torit UltraWeb Cartridge] (99.7% PM)
DC-202-W18-002	Baghouse 202, Consolidated Engineering, Model WS-25-8, 1967 [Torit UltraWeb Cartridge] (99.7% PM)
DC-202-W18-003	Baghouse 203, Torit, Model DFT-2-8, 2008 [Torit UltraWeb Cartridge] (99.7% PM)
DC-202-W18-004	Baghouse 204, Torit, Model DFT-2-8, 2008 [Torit UltraWeb Cartridge] (99.7% PM)
DC-202-W18-005	Baghouse 205, Torit, Model DFT-3-12, 2008 [Torit UltraWeb Cartridge] (99.7% PM)
FIL-202-W18-001	HEPA Filter 205H, Donaldson, Model Ultralock, 2008 (99.97% PM)

203-W18 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

The owner or operator shall operate and maintain the control devices at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, and Regulation 6.09, section 3.2, and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

i. For each PM emission point in EU 201-W18, the owner or operator shall not allow or cause the PM emissions to exceed 12.05 lb/hr. [Regulation 6.09, section 3.2]²⁶

ii. See Plantwide Specific Conditions.

e. TAC

i. See Plantwide Specific Conditions.

ii. For EU 201-W18, the owner or operator shall not allow TAC emissions of cobalt, copper, chromium(III), chromium(VI), manganese, or nickel to exceed de minimis levels. [Regulations 5.00 and 5.21] (See Comment 1.)

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

²⁶ The potential controlled hourly PM emissions meet the applicable emission standard in Regulation 6.09 after the first control device.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of the control devices for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the inlet water flowrate/pressure at least once during each operating day to ensure it is maintained within the operating ranges as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-202-W18-005, FIL-202-W18-001	0.1 – 6.5
DC-202-W18-001, DC-202-W18-002, DC-202-W18-003, DC-202-W18-004	0.4 – 7.5
FIL-202-W18-001	1.0 – 9.0

- iii. For any period of operating outside the established performance indicator range for the control devices, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. HAP/Opacity

See Plantwide Specific Conditions.

c. TAC

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);

- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,

- (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- b. **HAP/Opacity**

See Plantwide Specific Conditions.
- c. **TAC**
 - i. See Plantwide Specific Conditions.
 - ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.
- d. **PM/PM₁₀/PM_{2.5}**
 - i. See Plantwide Specific Conditions.
 - ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

201-W18 Comments

- 3. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

Emission Point	Co	Cr(III)	Cr(VI)	Cu	Mn	Ni
BD-202-W18-002, DD-202-W18-001/H-202-W18-001, DD-202-W18-002/H-202-W18-002, DD-202-W18-003/H-202-W18-003, DD-202-W18-004/H-202-W18-004, DD-202-W18-005/H-202-W18-005	3 rd	2 nd	3 rd	2 nd	2 nd	3 rd
FD-202-W18-001, FD-202-W18-003 FD-202-W18-004, FD-202-W18-005 PD-202-W18-001, PD-202-W18-003, PD-202-W18-004	3 rd	2 nd	3 rd	2 nd	2 nd	2 nd
PD-202-W18-005, VS-202-W18-001 VS-202-W18-003, VS-202-W18-004, VS-202-W18-005	3 rd	2 nd	3 rd	2 nd	2 nd	3 rd

Emission Unit 203-W22: C Kiln Manufacturing**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 4
7.09	Standards of Performance for New Process Gas Streams	1, 2, and 4

Equipment: 203-W22 Emission Point²⁷

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
HT-203-W22-900	Tunnel Kiln, 8 MMBtu/hr	2000	7.08, 7.09	NA ²⁸	S-203-W22-001

²⁷ Nitric acid will no longer be calculated as dust emission for this emission unit.

²⁸ Per 2/2/2021 application, Thermal Oxidizer TO-203-W22-900 is no longer in use. VOC products are no longer processed in HT-203-W22-900. Regulation 7.25 no longer applies to this emission point.

203-W22 Specific Conditions**S2. Standards**

[Regulation 2.03, section 6.1]

a. NO_x

- i. For EP HT-203-W22-900, the owner or operator shall not allow or cause the emissions of NO_x to exceed the following: [Regulation 7.08, section 4]

- (1) 300 ppmv, expressed as NO₂.
- (2) An invisible discharge.

- ii. See Plantwide Specific Conditions.

b. Opacity

See Plantwide Specific Conditions.

c. SO₂

The owner or operator shall not allow or cause the emissions of SO₂ to exceed 28.63 grains per 100 dscf from EP HT-203-W22-900.²⁹
[Regulation 7.09, Section 4]

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. NO_x

- i. For EP HT-203-W22-900, the owner or operator shall conduct a monthly visible emissions survey during normal process operation and daylight hours and maintain monthly records of the results. If an emission point is not being operated during a given month, then no survey needs to be performed and a negative declaration shall be entered in the record.

- ii. See Plantwide Specific Conditions.

b. Opacity

See Plantwide Specific Conditions.

²⁹ The potential uncontrolled SO₂ emissions are below the emission standard in Regulation 7.09.

c. **SO₂**

There are no monitoring or record keeping requirements.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. **NO_x**

- The date and time of each visible emissions survey where visible emissions were observed; and
- Description of corrective action taken for each occurrence.
- See Plantwide Specific Conditions.

b. **Opacity**

See Plantwide Specific Conditions.

c. **SO₂**

There are no reporting requirements.

Emission Unit 203-W23: Catalyst Drying**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
7.25	Standard of Performance for New Sources Using Volatile Organic Compounds	1 through 5

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 203-W23 Emission Point³⁰

Emission Point	Description	Install Date	Applicable Regulations	Control Device	Stack ID
HT-203-W23-534	Box Dryer, Wisconsin Oven, 2.5 MMBTU/hr	2003	STAR, 7.08, 7.25	ED-203-W23-150 SC-203-W23-550	S-203-W23-005
HT-203-W23-542	Box Dryer, Wisconsin Oven, 2.5 MMBTU/hr				
STAR Regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23.					

Control Devices

Control ID	Description
ED-203-W23-150	Jet venturi fume scrubber, CR Clean Air, Model 20x24/96V (75% NO _x & Nitric Acid, assuming 0% VOC & SO ₂)
SC-203-W23-550	Packed-bed Scrubber with Mesh Pad (75% NO _x & Nitric Acid, assuming 0% VOC & SO ₂), Sly, Model 54-72

³⁰ Ammonia emissions are no longer generated in this process per construction application 2/2/2021.

203-W23 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP HT-203-W23-534 and HT-203-W23-542, the owner or operator shall operate and maintain the control devices, ED-203-W23-150 and SC-203-W23-550, at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions.

[Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2]

b. HAP

See Plantwide Specific Conditions.

c. NO_x

i. For EP HT-203-W23-534 and HT-203-W23-542, the owner or operator shall not allow or cause the emissions of NO_x to exceed 300 ppm by volume, expressed as NO₂, or an invisible discharge.³¹ [Regulation 7.08]

ii. See Plantwide Specific Conditions.

d. TAC³²

i. The owner or operator shall not allow triethylamine emissions to exceed de minimis. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. The owner or operator shall not allow nitric acid emissions to exceed 1576.80 lb per 12-consecutive month period from each box dryer HT-203-W23-534 and HT-203-W23-542.³³[Regulation 5.21, section 4.3] (See Comment 1.)

iii. See Plantwide Specific Conditions.

e. VOC

i. The owner or operator shall not allow or cause plantwide VOC emissions from all affected facilities subject to Regulation 7.25 to equal or exceed 5

³¹ EP HT-203-W23-534 and HT-203-W23-542 cannot exceed the 300 ppmv NO_x standard uncontrolled.

³² Per application sent in on 2/2/2021, ammonia emissions are no longer generated in this process.

³³ The facility modeled 0.18 lb/hr nitric acid using AERMOD (tier 4), submitted December 2, 2020.

tons during any 12 consecutive month period, unless a BACT is submitted and approved by the District. [Regulation 7.25, section 2.1 and 3.1]

- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping
[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of SC-203-W23-550 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop of SC-203-W23-550 at least once during each operating day to ensure it is maintained between 0.5 and 8.0 " w.c.
- iii. The owner or operator shall monitor and record the inlet water flowrate of SC-203-W23-550 at least once during each operating day to ensure it is maintained above 10 gpm.
- iv. For any period of operating outside the established performance indicator range for SC-203-W23-550, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. NO_x

- i. For EP HT-203-W23-534 and HT-203-W23-542, the owner or operator shall conduct a monthly visible emissions survey during normal process operation and daylight hours and maintain monthly records of the results. If an emission point is not being operated during a given month, then no

survey needs to be performed and a negative declaration shall be entered in the record.

- ii. See Plantwide Specific Conditions.

d. TAC

- i. The owner or operator shall limit production from HT-203-W23-534 or HT-203-W23-542 to 369 pounds per hour and 898 hours per 12-consecutive month period. [Regulations 5.00 and 5.21]
- ii. For HT-203-W23-534 and HT-203-W23-542, when processing TEAOH products, the owner or operator shall daily record the type and amount of product transferred and the hours of operation. If TEAOH production exceeds 369 pounds per hour or the operation exceeds 898 hours per 12-consecutive month period, the owner or operator shall calculate and record the lb/12 consecutive month period triethylamine emissions.
- iii. See Plantwide Specific Conditions.
- iv. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period); and
 - (4) Summary information on the cause of the event, corrective action taken, and measures implemented to prevent recurrence.

e. VOC

- i. The owner or operator shall calculate and record the plantwide consecutive 12-month VOC emissions from all affected facilities subject to Regulation 7.25 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following

the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - The date,
 - The observed performance indicator value, and
 - Corrective action taken to minimize the extent of the excursion, and
 - Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. NO_x

- The date and time of each visible emissions survey where visible emissions were observed; and
- Description of corrective action taken for each occurrence.
- See Plantwide Specific Conditions.

d. TAC

- For HT-203-W23-534 and HT-203-W23-542, report:
 - The amount (lbs) of TEAOH products processed for each month in the report period.
 - The 12-consecutive month hours of operation processing TEAOH products for each month in the report period.
 - If the production limit or hours of operation is exceeded, the lb/12-consecutive month triethylamine emissions for each month in the report period.

- ii. Identification of all periods when a process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period); and
 - (4) Summary information on the cause of the event, corrective action taken, and measures implemented to prevent reoccurrence.
- iii. See Plantwide Specific Conditions.

e. VOC

- i. The plantwide consecutive 12-month VOC emissions from all affected facilities subject to Regulation 7.25 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.

203-W23 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

EP	Triethylamine ³⁴	HNO ₃
HT-203-W23-534	1 st	Over de minimis ³⁵
HT-203-W23-542	1 st	Over de minimis ²⁶

³⁴ Triethylamine emissions do not exceed de minimis levels with the limited processing rate and hours of operation.

³⁵ This emission point exceeds de minimis controlled, but the company provided SCREEN3 modeling on 12/4/2020 which meets the EA goals.

Emission Unit 203-W25: Specialty Extrusion Manufacturing

Applicable Regulations

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 203-W25 Emission Point³⁶

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
CV-203-W25-134	Belt Conveyor	2001	7.08	NA ³⁷	Fugitive
T-203-W25-804	Nitric Acid Tote	2020	STAR	SC-203-W25-133	S-201-W25-003
T-203-ACID-801 ³⁸	Acetic Acid Day Tank	2001	7.25		
T-203-ACID-802	HNO ₃ Day Tank	2001	STAR		

Control Devices

Control ID	Description
SC-203-W25-133	Packed-bed Scrubber with Mist Eliminator (95% PM, 75% NH ₃), Sly Model 54-72

³⁶ Nitric acid will no longer be calculated as dust emission for this emission unit.

³⁷ CV-203-W25-134 is no longer controlled by DC-203-W25-140, emissions are fugitive per application sent in 2/2/2021. Nitric acid is no longer assumed to be emitted from this emission point.

³⁸ T-203-ACID-801 and T-203-ACID-802 are no longer controlled by ED-203-W25-205.

203-W25 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP T-203-W25-804, the owner or operator shall operate and maintain the control device SC-203-W25-133 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21]

b. Opacity

See Plantwide Specific Conditions.

c. PM/PM₁₀/PM_{2.5}

i. For CV-203-W25-134, the owner or operator shall not allow or cause PM emissions to exceed 3.00 lb/hr. [Regulation 7.08, section 3.1.2]³⁹

ii. See Plantwide Specific Conditions.

d. TAC

i. For T-203-ACID-802 and T-203-W25-804, the owner or operator shall not allow nitric acid emissions to exceed de minimis. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. See Plantwide Specific Conditions.

e. VOC

i. The owner or operator shall not allow or cause plantwide VOC emissions from all affected facilities subject to Regulation 7.25 to equal or exceed 5 tons during any 12 consecutive month period, unless a BACT is submitted and approved by the District. [Regulation 7.25, section 2.1 and 3.1]

ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

³⁹ The equipment does not exceed the emission limit uncontrolled.

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of SC-203-W25-133 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and the inlet water flowrate at least once during each operating day to ensure it is maintained within the operating ranges as shown in the table below.

Control ID	Inlet Water Flowrate (gpm)
SC-203-W25-133	≥ 10

- iii. For any period of operating outside the established performance indicator range for SC-203-W25-133, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. Upon notification to the District, the owner or operator may modify the performance indicator ranges for SC-203-W25-133, once during the life of this operating permit, based on plant operating trends. Records of the operating trends that necessitated a change shall be kept for the life of the control device.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

e. VOC

- i. The owner or operator shall calculate and record the plantwide consecutive 12-month VOC emissions from all affected facilities subject to Regulation 7.25 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

e. VOC

- i. The owner or operator shall report the plantwide consecutive 12-month VOC emissions from all affected facilities subject to Regulation 7.25 for each month in the reporting period.
- ii. See Plantwide Specific Conditions.

203-W25 Comments

1. The potential uncontrolled nitric acid emissions from EP T-203-ACID-802 and T-203-W25-804 are less than the de minimis levels in Regulations 5.00 and 5.21.

Emission Unit: 204-W35: Dipping System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
6.09	Standards of Performance for Existing Process Operations	1 through 3 and 5
7.08	Standards of Performance for New Process Operations	1 through 3

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 204-W35 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
H-204-W35-001	Hopper	2020	7.08	NA	Fugitive
CV-204-W35-001	Conveyor	2020	7.08	NA	Fugitive
MX-204-W35-001 ⁴⁰	Rotary Impregnator	1967	6.09, STAR	DC-204-W35-001	S-204-W35-004

Control Devices

Control ID	Description
DC-204-W35-001	Fabric Filter (99.7%), Donaldson, Model Torit 2DF-4 Downflo [Torit UltraWeb Cartridge type]

⁴⁰ Metal HAPs/TACs are no longer emitted from MX-204-W35-001 per application sent in 2/2/2021. Metals were associated with second pass carrier addition which is no longer used. Sulfuric acid is still emitted from the mixer.

204-W35 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP MX-204-W35-001, the owner or operator shall operate and maintain the control device DC-204-W35-001 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21]

b. Opacity

See Plantwide Specific Conditions

c. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 6.09, section 3.1.2, and 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)	Regulation
201-W35 ⁴¹	H-204-W35-001, CV-204-W35-001	3.75	7.08
	MX-204-W35-001	4.30	6.09

- ii. See Plantwide Specific Conditions.

d. TAC

- i. For MX-204-W35-001, the owner or operator shall not allow sulfuric acid emissions to exceed de minimis. (See Comment 1.)
- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-204-W35-001 for signs of

⁴¹ The potential uncontrolled hourly PM emissions meet the applicable emission standard.

damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.

- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-204-W35-001	1.0 – 6.5

- iii. For any period of operating outside the established performance indicator range for DC-204-W35-001, the owner or operator shall maintain the following records:
- (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

Reporting Period

January 1 through June 30

July 1 through December 31

Report Due Date

August 29

March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.

- (1) The date,
- (2) The observed performance indicator value, and
- (3) Corrective action taken to minimize the extent of the excursion, and
- (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements for the emission unit.

c. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

See Plantwide Specific Conditions.

203-W35 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

EP	H ₂ SO ₄
MX-204-W35-001	uncontrolled

Emission Unit 204-W36: Small Eirich Mixing System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 204-W36 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
MX-204-W36-001 ⁴²	Eirich Mixer	1999	7.08, STAR, 40 CFR 63 VVVVVV	DC-204-W36-001 FIL-204-W36-002	S-204-W36-002
BC-204-W36-004	Bag Compactor	2020	7.08	FIL-204-W36-004	Fugitive
BC-204-W36-005	Bag Compactor	2020	7.08	FIL-204-W36-005	Fugitive

Control Devices

Control ID	Description
DC-204-W36-001	Fabric Filter (92.8%), Consolidated Engineering, Model P8 [Polyester type, but based on July 21, 2020, stack test, report received October 1, 2020]
FIL-204-W36-002	HEPA filter (99.97%), Donaldson Torit Model Ultra Lok 1x1
FIL-204-W36-004	Filter sock (95%)
FIL-204-W36-005	Filter sock (95%)

⁴² The equipment will be raising its processing rate to 1000 lbs/hr per the application sent in 2/2/2021.

204-W36 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

- i. For EP MX-204-W36-001, the owner or operator shall operate and maintain the control devices DC-204-W36-001 and FIL-204-W36-002 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]
- ii. The owner or operator shall not allow the processing rate for MX-204-W36-001 to exceed 1000 lb/hr. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
201-W36 ⁴³	MX-204-W36-001	2.34
	BC-204-W36-004 and BC-204-W36-005	5.17 each

- ii. See Plantwide Specific Conditions.

e. TAC

- i. The owner or operator shall not allow emissions of chromium(III) or copper to exceed de minimis levels from MX-204-W36-001. [Regulations 5.00 and 5.21] (See Comment 1.)

⁴³ The potential controlled emissions from MX-204-W36-001 do not exceed the emission limit after the first control device, and the potential uncontrolled emissions from BC-204-W36-004 and BC-204-W36-005 do not exceed the emission limit.

- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-204-W36-001 and FIL-204-W36-002 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-204-W36-001	0.5 – 10.0
FIL-204-W36-002	0.01 – 5.0

- iii. For any period of operating outside the established performance indicator range for DC-204-W36-001 and FIL-204-W36-002, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.
- v. The owner or operator shall monitor and record the processing rate from MX-204-W36-001.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no monitoring or recordkeeping requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. HAP

See Plantwide Specific Conditions.

c. Opacity

There are no reporting requirements.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of each TAC (lb/hr and lb/avg. period);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

204-W36 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

EU	EP	Copper	Cr(III)
204-W36	MX-204-W36-001	2 nd	2 nd

Emission Unit 204-W39: C28 Manufacturing**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 204-W39 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
H-204-W39- 417	Hopper	2000	7.08, STAR, 40 CFR 63 VVVVVV	DC-204-W32-407 FIL-204-W32-407	S-204- W32-002

Control Devices

Control ID	Description
DC-204-W32-407	Baghouse (99.8%) [MAC 80/20 type]
FIL-204-W32-407	HEPA Filter (99.97%)

204-W39 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP H-204-W39-417, the owner or operator shall operate and maintain the control devices DC-204-W32-407 and FIL-204-W32-407 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions

d. PM/PM₁₀/PM_{2.5}

i. For H-204-W39-417, the owner or operator shall not allow or cause PM emissions to exceed 2.34 lb/hr. [Regulation 7.08, section 3.1.2]⁴⁴

ii. See Plantwide Specific Conditions.

e. TAC

i. The owner or operator shall not allow nickel emissions to exceed de minimis levels from H-204-W39-417. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

⁴⁴ The potential controlled emissions do not exceed the emission limit after the first control device.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-204-W32-407 and FIL-204-W32-407 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-204-W32-407	0.05 – 10.0
FIL-204-W32-407	0.05 – 5.0

- iii. For any period of operating outside the established performance indicator range for DC-204-W32-407 and FIL-204-W32-407, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. HAP

See Plantwide Specific Conditions.

d. TAC

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);

- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

e. **PM/PM₁₀/PM_{2.5}**

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. **Control Device Operation**

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,

- (2) The observed performance indicator value, and
- (3) Corrective action taken to minimize the extent of the excursion, and
- (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements for the emission unit.

c. HAP

See Plantwide Specific Conditions.

d. TAC

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

204-W39 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

Emission Point	Ni
H-204-W39-417	2 nd

Emission Unit 204-W42: Box Dryers and Sergeant Dryer System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
7.09	Standards of Performance for New Process Gas Streams	1, 2, and 4
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 204-W42 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
CV-204-W42-003	Conveyor	2003	7.08, STAR, 40 CFR 63 VVVVVV	DC-204-W42-001 FIL-204-W42-001	S-204- W42-003
HT-204-W42-001	Electric Belt Calciner	1980	7.08, 7.09, STAR, 40 CFR 63 VVVVVV	ED-204-W42-010 SEP-204-W42-001 SEP-204-W42-002	S-204- W42-001

Control Devices

Control ID⁴⁵	Description
DC-204-W42-001	Baghouse (99.7%), Torit, Model DFT 2-8 [Torit UltraWeb Cartridge type]
FIL-204-W42-001	HEPA Filter (99.97%), Donaldson Torit, Model Ultralok
ED-204-W42-010	Eductor with BMF Mist Eliminator (95%), SCI, Model 12"
SEP-204-W42-001	Cyclone (75%) Libco
SEP-204-W42-002	Cyclone (75%) Libco

⁴⁵ SEP-204-W42-001 and SEP-204-W42-002 are new control device equipment per application sent in 2/2/2021.

204-W42 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP CV-204-W42-003 and HT-204-W42-001, the owner or operator shall operate and maintain the control devices DC-204-W42-001, ED-204-W42-010, SEP-204-W42-001, and SEP-204-W42-002 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 5.00 and 5.21, and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions

d. PM/PM₁₀/PM_{2.5}

i. For HT-204-W42-001 and CV-204-W42-003, the owner or operator shall not allow or cause PM emissions to exceed 2.34 lb/hr, each. [Regulation 7.08, section 3.1.2]⁴⁶

ii. See Plantwide Specific Conditions.

e. SO₂

The owner or operator shall not allow or cause the emissions of SO₂ to exceed 28.63 grains per 100 dscf at 0% excess oxygen from EP HT-204-W42-001. [Regulation 7.09, section 4]

f. TAC

i. The owner or operator shall not allow copper and nickel emissions to exceed de minimis levels from HT-204-W42-001 and CV-204-W42-003. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. See Plantwide Specific Conditions.

⁴⁶ The potential controlled emissions do not exceed the emission limit after the first control device.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of the control devices for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-204-W42-001	0.05 – 7.5
FIL-204-W42-001	0.01 – 7.5
SEP-204-W42-001 and SEP-204-W42-002	0.0 – 4.0

- iii. For ED-204-W42-010, the owner or operator shall monitor and record the water makeup pressure at least once during each operating day to ensure it is greater than or equal to 20 psi.
- iv. For ED-204-W42-010, the owner or operator shall monitor and record the inlet water flow rate at least once during each operating day to ensure it is greater than or equal to 2 gpm.
- v. For any period of operating outside the established performance indicator range for the control devices the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- vi. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. **HAP**

See Plantwide Specific Conditions.

d. **TAC**

i. See Plantwide Specific Conditions.

ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of each TAC (lb/hr and lb/avg. period);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

e. **PM/PM₁₀/PM_{2.5}**

i. See Plantwide Specific Conditions.

ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements for the emission unit.

c. HAP

See Plantwide Specific Conditions.

d. TAC

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

e. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.

- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
- (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

204-W42 Comments

2. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

EP	HCl	Cu	Ni
CV-204-W42-003	--	1 st	1 st
HT-204-W42-001	Unc.	3 rd	3 rd

Emission Unit 220-W51: Acid Unloading System**Applicable Regulations**

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 220-W51

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
T-220-Acid-800 ⁴⁷	Nitric Storage Tank, 9,770 gal	2000	STAR	ED-220-W51-001	S-220-NITR-14

Control Devices

Control ID	Description
ED-220-W51-001	Eductor (75%), Schutte & Koerting, Model 7014

⁴⁷ Per application sent in 2/2/2021, the tank has been re-purposed for nitric acid usage and no longer generates acetic acid emissions.

220-W51 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. TAC

- i. The owner or operator shall not allow nitric acid emissions to exceed de minimis levels from T-220-Acid-800. (See Comment 1.)
- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. TAC

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. TAC

See Plantwide Specific Conditions.

220-W51 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis in Regulations 5.00 and 5.21, with the listed levels of control.

EP	HNO ₃
T-220-Acid-800	uncontrolled

Emission Unit 220-W53: Nickel Nitrate System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 220-W53 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
HT-220-W53-002HZ	Belt Calciner, 3.0 MMBtu/hr (Heating Zone)	1996	7.08	ED-220-W52-004 thru 007 ED-220-W52-008 SC-220-W52-001 V-220-W54-001 (stage 1) V-220-W52-002 (stage 2)	S-220-W53-011
HT-220-W53-002CZ	Belt Calciner (Cooling Zone)	1996	7.08, STAR, 40 CFR 63 VVVVVV	DC-220-W53-003 FIL-220-W53-006	S-220-W53-005
HT-220-W53-002D	Belt Calciner (Discharge End)	1996		DC-220-W53-004 FIL-220-W53-007	S-220-W53-006

Control Devices

Control ID	Description
ED-220-W52-004	Eductor (95% PM, 75% NO _x), Schutte & Koerting, Model 7014 L 8
ED-220-W52-005	Eductor (95% PM, 75% NO _x), Schutte & Koerting, Model 7014 L 8
ED-220-W52-006	Eductor (95% PM, 75% NO _x), Schutte & Koerting, Model 7014 L 8
ED-220-W52-007	Eductor (95% PM, 75% NO _x), Schutte & Koerting, Model 7014 L 8
ED-220-W52-008	Eductor (95% PM, 75% NO _x & Ammonia), Schutte & Koerting, Model 7014 L 8, 1996
SC-220-W52-001	Impingement Plate Scrubber (95% PM, 75% NO _x & Ammonia), W. W. Sly, Model 330, 1996
V-220-W54-001	Packed Scrubber Tower (75% NO _x), Croll Reynolds, Model 30T-15-10H/48V
V-220-W52-002	Packed Tower Scrubber #2 (75% NO _x), Croll Reynolds, Model 72T-10NOX
DC-220-W53-003	Baghouse (95% PM, 75% NO _x), Flex-Kleen, Model 226-CDCC-4-3-24
DC-220-W53-004	Baghouse (95% PM, 75% NO _x), Flex-Kleen, Model 226-CDCC-3-2-12
FIL-220-W53-006	HEPA filter (99.97%)
FIL-220-W53-007	HEPA filter (99.97%)

220-W53 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP HT-220-W53-002HZ, HT-220-W53-002CZ, and HT-220-W53-002D, the owner or operator shall operate and maintain the control devices at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, 7.08, and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. NO_x

i. From EP HT-220-W53-002HZ, the owner or operator shall not allow or cause the emissions of NO_x to exceed 300 ppmv, expressed as NO₂, or an invisible discharge.⁴⁸ [Regulation 7.08]

ii. See Plantwide Specific Conditions.

d. Opacity

See Plantwide Specific Conditions.

e. PM/PM₁₀/PM_{2.5}

i. For HT-220-W53-002CZ and HT-220-W53-002D, the owner or operator shall not allow or cause PM emissions to exceed 2.81 lb/hr, each. [Regulation 7.08, section 3.1.2]⁴⁹

ii. See Plantwide Specific Conditions.

f. TAC

i. The owner or operator shall not allow chromium(III), cobalt, copper, manganese, or nickel, emissions to exceed de minimis levels from HT-220-W53-002CZ and HT-220-W53-002D. [Regulations 5.00 and 5.21] (See Comment 1.)

⁴⁸ The potential controlled NO_x emissions from EP T-220-W52-005, HT-220-W53-002 and HT-220-W54-001b meet the applicable NO_x emission standard in Regulation 7.08.

⁴⁹ The potential uncontrolled emissions do not exceed the emission limit.

- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-220-W53-003, DC-220-W53-004, FIL-220-W53-006, FIL-220-W53-007, ED-220-W52-004, ED-220-W52-005, ED-220-W52-006, ED-220-W52-007, ED-220-W52-008, SC-220-W52-001, V-220-W52-001 and/or V-220-W52-002 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop/Vacuum
ED-220-W52-005, ED-220-W52-006, ED-220-W52-007	-0.1 – -5.0 " w.c.
ED-220-W52-008	> 40 psi
DC-220-W53-003, DC-220-W53-004, FIL-220-W53-006, FIL-220-W53-007	1.0 – 5.0 " w.c.
SC-220-W52-001	0.01 – 7.0 " w.c.
V-220-W54-001	> 7 psi
	> 10 psi

- iii. The owner or operator shall monitor and maintain records of the inlet water flow rate at least once during each operating day to ensure it is within the operating ranges as shown in the table below.

Emission Point	Inlet Water Flowrate (gpm)
ED-220-W52-005, ED-220-W52-006, ED-220-W52-007	5 – 25
V-220-W52-002	> 10

- iv. For any period of operating outside the established performance indicator range the owner or operator shall maintain the following records:
- (1) The date,
 - (2) The observed performance indicator value,

- (3) Corrective action taken to minimize the extent of the excursion, and
- (4) Measures implemented to prevent reoccurrence.

v. See Plantwide Specific Conditions..

b. NO_x

- i. From EP HT-220-W53-002HZ, the owner or operator shall conduct a monthly visible emissions survey during normal process operation and daylight hours and maintain monthly records of the results. If an emission point is not being operated during a given month, then no survey needs to be performed and a negative declaration shall be entered in the record.
- ii. See Plantwide Specific Conditions.

c. Opacity

There are no monitoring or recordkeeping requirements.

d. HAP/PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following

the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. NO_x

- i. The date and time of each visible emissions survey where visible emissions were observed; and
- ii. Description of corrective action taken for each occurrence.
- iii. See Plantwide Specific Conditions.

c. Opacity

There are no monitoring or recordkeeping requirements.

d. HAP/PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

e. TAC

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the following information:

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of each TAC (lb/hr and lb/avg. period);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

220-W53 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

EU	EP	Co	Cr(III)	Cu	Mn	Ni
220-W52	HT-220-W53-002CZ	2 nd	unc.	unc.	unc.	1 st
	HT-220-W53-002D	2 nd	unc.	2 nd	1 st	2 nd

Emission Unit 220-W54: Nickel Nitrate System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 220-W54 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
DD-220-W54-005	Drum Dumper	1996	7.08, STAR, 40 CFR 63 VVVVVV	DC-220-W54-002 FIL-220-W54-002	S-220- W54-010
H-220-W54-006	Hopper				
FD-220-W54-003A/B	Feeder/Belt Conveyor (only one operated at a time)				
VS-220-W54-020	Screener	1996	7.08, STAR, 40 CFR 63 VVVVVV	DC-220-W54-005 FIL-220-W54-005	S-220- W54-009

Control Devices

Control ID	Description
DC-220-W54-002	Baghouse (95% ⁵⁰), Flex-Kleen, Model 226-CDCC-3-2-12(III), 1996
DC-220-W54-005	Baghouse (95% ⁴⁹), Flex-Kleen, Model 226-CDCC-4-3-24(III), 1996
FIL-220-W54-002	HEPA Filter (99.97%), Camill Farr 855210008, 2007
FIL-220-W54-005	HEPA Filter (99.97%), Camill Farr 855210008, 2007

⁵⁰ Baghouses DC-002 through DC-006 in Building 20 use a default control efficiency of 95%.

220-W54 Specific Conditions**S1. Standards**

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP DD-220-W54-005, H-220-W54-006, FD-220-W54-003A/B and VS-220-W54-020, the owner or operator shall operate and maintain the control devices DC-220-W54-002, DC-220-W54-005, FIL-220-W54-002, and FIL-220-W54-005 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2 and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

i. For DD-220-W54-005, H-220-W54-006, FD-220-W54-003A/B and VS-220-W54-020, the owner or operator shall not allow or cause PM emissions to exceed 3.59 lb/hr, each. [Regulation 7.08, section 3.1.2]⁵¹

ii. See Plantwide Specific Conditions.

e. TAC

i. The owner or operator shall not allow chromium(III), chromium(VI), cobalt, manganese, or nickel emissions to exceed de minimis levels from DD-220-W54-005, H-220-W54-006, or FD-220-W54-003A/B. [Regulations 5.00 and 5.21] (See Comment 1.)

ii. The owner or operator shall not allow chromium(III), chromium(VI), cobalt, copper, manganese, or nickel emissions to exceed de minimis levels from VS-220-W54-020. [Regulations 5.00 and 5.21] (See Comments.)

iii. See Plantwide Specific Conditions.

⁵¹ The potential uncontrolled emissions do not exceed the emission limit.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-220-W54-002, DC-220-W54-005, FIL-220-W54-002, and FIL-220-W54-005 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop/vacuum
DC-220-W54-005	1.0 – 5.0 " w.c.
FIL-220-W54-002	0.01 – 10.0 " w.c.
FIL-220-W54-005	0.01 – 10.0 " w.c.

- iii. For any period of operating outside the established performance indicator range for DC-220-W54-005, FIL-220-W54-002, and/or FIL-220-W54-005, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. HAP/PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

d. TAC

- i. See Plantwide Specific Conditions.

- ii. For any period of time when the process was operating and a TAC control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of each TAC (lb/hr and lb/avg. period);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements.

c. **HAP/PM/PM₁₀/PM_{2.5}**

See Plantwide Specific Conditions.

d. **TAC**

i. See Plantwide Specific Conditions.

ii. Identification of all periods when the process was operating and a TAC control device was not operating, including the information below.

- (1) The duration of the control device downtime;
- (2) The process throughput during the control device downtime;
- (3) The emissions of each TAC (lb/hr and lb/avg. period);
- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

220-W54 Comments

1. The potential TAC emissions for the emission points in the table below are less than de minimis, with the listed levels of control.

EU	EP	Co	Cr(III)	Cr(VI)	Cu	Mn	Ni
220-W54	DD-220-W54-005	2 nd	unc.	2 nd	--	1 st	2 nd
	H-220-W54-006	2 nd	unc.	2 nd	--	1 st	2 nd
	FD-220-W54-003A/B	2 nd	unc.	2 nd	--	1 st	2 nd
	VS-220-W54-020	2 nd	unc.	2 nd	2 nd	1 st	2 nd

“--” This emission point has no emissions of the specified TAC.

Emission Unit 220-W55: Houdry System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3
40 CFR 63 Subpart VVVVVV	National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources	63.11495, 63.11501(c)(1), 63.11501(d), and 63.11496(f)(3)

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 220-W55 Emission Points⁵²

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
H-250-W55-802	Hopper	1993	7.08, STAR, 40 CFR 63 VVVVVV	DC-250-W55-901 FIL-250-W55-901	S-250-W55-030
EPD-250-W55-401B	401B Emergency Drumout	2020	7.08	DC-250-W55-601	S-250-W55-018

⁵² Nitric acid will no longer be calculated as dust emission for this emission unit.

Control Devices

Control ID	Description
DC-250-W55-601	Baghouse (99.8%), Mikro-Pulsaire, Model 500-S-20-20-C
DC-250-W55-901	Baghouse (99.7%), Torit, Model DFT 2-8
FIL-250-W55-901	HEPA filter (99.97%), Donaldson Model Ultra-Lok

220-W55 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP H-250-W55-802 and EPD-250-W55-401B, the owner or operator shall operate and maintain the control devices DC-250-W55-601 and DC-250-W55-901 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 7.08, section 3.1.2, and 40 CFR 63 Subpart VVVVVV]

b. HAP

See Plantwide Specific Conditions.

c. Opacity

See Plantwide Specific Conditions

d. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]⁵³

EP	Emission Limit (lb/hr)
H-250-W55-802	3.41
EPD-250-W55-401B	4.12

- ii. See Plantwide Specific Conditions.

e. TAC

- i. The owner or operator shall not allow chromium(III) emissions to exceed de minimis levels from H-250-W55-802. [Regulations 5.00 and 5.21] (See Comment 1.)
- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping [Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

⁵³ The potential controlled emissions do not exceed the emission limit after the first control device.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-250-W55-601 and DC-250-W55-901 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.
- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop/vacuum
DC-250-W55-601	0.1 – 5.0 " w.c.
DC-250-W55-901	0.2 – 6.0 " w.c.

- iii. For any period of operating outside the established performance indicator range for DC-250-W55-601 and/or DC-250-W55-901, the owner or operator shall maintain the following records:
 - (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. HAP/TAC

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);

- (4) Summary information on the cause of the event, corrective action taken; and
- (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.
 - (1) The date,
 - (2) The observed performance indicator value, and
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements.

c. HAP/TAC

See Plantwide Specific Conditions.

d. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.

- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
 - (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

220-W55 Comments

- 1. The potential uncontrolled chromium(III) emissions from EP H-250-W55-802 are less than de minimis.

Emission Unit 251-W57: G84 Styrene System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

Equipment: 251-W57 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
CV-251-W57-004	Rework Conveyor	2009	7.08	DC-251-W57-001 FIL-251-W57-001	S-251-W57-001
VS-251-W57-003 ⁵⁴	Vibratory Screener	2009		DC-251-W57-005 FIL-251-W57-001	S-251-W57-001

Control Devices

Control ID	Description
DC-251-W57-001	Baghouse (95%), Flex-Kleen 43/54-PSTH-121
DC-251-W57-005	Baghouse (95%), Flex-Kleen, Model 28/36-PVTL-25
FIL-251-W57-001	HEPA Filter (99.97%), Flex-Kleen Model Magna/Pack

⁵⁴ This screener 003 was incorrectly identified as 002 in the original application.

251-W57 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Control Device Operation

For EP CV-251-W57-004 and VS-251-W57-003, the owner or operator shall operate and maintain the control devices DC-251-W57-001, DC-251-W57-005, and FIL-251-W57-001 at all times an associated emission point is in operation, including periods of startup, shutdown, and malfunction, in a manner consistent with good air pollution control practice for minimizing emissions. [Regulations 2.05, 5.00 and 5.21, Regulation 7.08 section 3.1.2]

b. Opacity

See Plantwide Specific Conditions.

c. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
201-W57 ⁵⁵	CV-251-W57-004	3.81
	VS-251-W57-003	3.02

- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Control Device Operation

- i. The owner or operator shall monthly perform a visual inspection of the structural and mechanical integrity of DC-251-W57-001, DC-251-W57-005, and FIL-251-W57-001 for signs of damage, air leakage, corrosion, or other equipment defects, and repair and/or replace defective components as needed. The owner or operator shall maintain monthly records of the results.

⁵⁵ The potential controlled emissions do not exceed the emission limit after the first control device for both limits.

- ii. The owner or operator shall monitor and record the pressure drop/vacuum at least once during each operating day to ensure it is maintained within the operating range as shown in the table below.

Control ID	Pressure Drop (" w.c.)
DC-251-W57-001 and DC-251-W57-005	1.0 – 6.0
FIL-251-W57-001	1.0 – 7.0

- iii. For any period of operating outside the established performance indicator range for DC-251-W57-001, DC-251-W57-005, and FIL-251-W57-001, the owner or operator shall maintain the following records:
- (1) The date,
 - (2) The observed performance indicator value,
 - (3) Corrective action taken to minimize the extent of the excursion, and
 - (4) Measures implemented to prevent reoccurrence.
- iv. See Plantwide Specific Conditions.

b. Opacity

There are no monitoring or recordkeeping requirements.

c. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. For any period of time when the process was operating and a PM control device was not operating, the owner or operator shall maintain the following records:
- (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were

no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Control Device Operation

- i. Identification of all periods of operating outside the established performance indicator range for a control device, including the information below.

- (1) The date,
- (2) The observed performance indicator value, and
- (3) Corrective action taken to minimize the extent of the excursion, and
- (4) Measures implemented to prevent reoccurrence.

b. Opacity

There are no reporting requirements.

c. PM/PM₁₀/PM_{2.5}

- i. See Plantwide Specific Conditions.
- ii. Identification of all periods when a process was operating and an associated control device was not operating, including the information below.
- (1) The duration of the control device downtime;
 - (2) The process throughput during the control device downtime;
 - (3) The emissions of PM (lb/hr) and PM/PM₁₀/PM_{2.5} (tons);
 - (4) Summary information on the cause of the event, corrective action taken; and
 - (5) Measures implemented to prevent reoccurrence.

Emission Unit 204-W58: Product mixing system**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.08	Standards of Performance for New Process Operations	1 through 3

Equipment: 204-W58 Emission Point⁵⁶

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
CV-204-W58-003	Belt Conveyor	1998	7.08	NA	Fugitive
CV-204-W58-004	Belt Conveyor	1998		NA	Fugitive
HT-204-W58-001	Belt Dryer	1998		NA	Fugitive
PD-204-W58-001	Product Drum	1998		NA	Fugitive
CV-204-W58-123 ⁵⁷	Belt Conveyor	2001		NA	Fugitive
RS-203-W58-134	Rotary Screener	2001		NA	Fugitive
H-204-W58-002	Hopper	1999		NA	Fugitive
CV-204-W58-005	Belt Conveyor	1999		NA	Fugitive
SDR-204-W58-001	Spheredizer Drum	1999		NA	Fugitive

⁵⁶ Nitric acid products are no longer processed in Emission Unit W58 per application sent in 2/2/2021.

⁵⁷ CV-203-W25-123 and RS-203-W25-134 have been moved to Emission Unit W58 per application sent in 2/2/2021.

204-W58 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Opacity

See Plantwide Specific Conditions.

b. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EU	EP	Emission Limit (lb/hr)
204-W58 ⁵⁸	CV-204-W58-003, CV-204-W58-004, HT-204-W58-001, PD-204-W58-001, CV-204-W58-123, RS-203-W58-134, H-204-W58-002, CV-204-W58-005, and SDR-204-W58-001	2.34 each

- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

a. Opacity

There are no monitoring or recordkeeping requirements.

b. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following

⁵⁸ The potential uncontrolled emissions do not exceed the emission limit.

the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Opacity

There are no reporting requirements for Opacity.

b. PM/PM₁₀/PM_{2.5}

See Plantwide Specific Conditions.

Emission Unit 203-W70: ENVICAT System**Applicable Regulations**

FEDERALLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
7.25	Standard of Performance for New Sources Using Volatile Organic Compounds	1 through 5

DISTRICT ONLY ENFORCEABLE REGULATIONS		
Regulation	Title	Applicable Sections
5.00	Definitions	1, 2
5.01	General Provisions	1 through 2
5.20	Methodology for Determining Benchmark Ambient Concentration of a Toxic Air Contaminant	1 through 6
5.21	Environmental Acceptability for Toxic Air Contaminants	1 through 5
5.22	Procedures for Determining the Maximum Ambient Concentration of a Toxic Air Contaminant	1 through 5
5.23	Categories of Toxic Air Contaminants	1 through 6
STAR regulations are 5.00, 5.01, 5.20, 5.21, 5.22, and 5.23		

Equipment: 203-W70 Emission Point

Emission Point	Description	Install Date	Applicable Regulations	Control ID	Stack ID
TT-203-W70-302B	Spiker Tote	2016	STAR	NA	Fugitive
DR-203-W70-501A/B	Vacuum Tables (2)	2016	7.25, STAR	NA	Fugitive
P-203-W70-102, equipped with internal filter (95%)	Vacuum Conveyor	new	7.08	NA	NA
P-203-W70-404, equipped with internal filter (95%)	Vacuum Conveyor	new	7.08	NA	NA
MX-203-W70-401	Mixer	new	STAR	ED-203-W23-150 SC-203-W23-550	S-203-W23-005
MX-203-W70-402	Mixer	new			

Control Devices

Control ID	Description
ED-203-W23-150	Jet venturi fume scrubber, CR Clean Air, Model 20x24/96V (75% NO _x & nitric acid, assuming 0% VOC & SO ₂)
SC-203-W23-550	Packed-bed Scrubber with Mesh Pad (75% NO _x & nitric acid, assuming 0% VOC & SO ₂), Sly, Model 54-72

203-W70 Specific Conditions

S1. Standards

[Regulation 2.03, section 6.1]

a. Opacity

See Plantwide Specific Conditions.

b. PM/PM₁₀/PM_{2.5}

- i. The owner or operator shall not allow or cause PM emissions to exceed the following limits. [Regulation 7.08, section 3.1.2]

EP ⁵⁹	Emission Limit (lb/hr)
P-203-W70-102	2.34
P-203-W70-404	2.71

- ii. See Plantwide Specific Conditions.

c. TAC

- i. See Plantwide Specific Conditions.
- ii. The owner or operator shall not allow nitric acid emissions to exceed de minimis levels from EP TT-203-W70-302B, DR-203-W70-501A/B, MX-203-W70-401 and MX-203-W70-402. (See Comment 1.)

d. VOC

- i. For affected facilities subject to Regulation 7.25, the owner or operator shall not allow or cause the plantwide VOC emissions to exceed 5 tons per year, unless modeling or a BACT analysis has been submitted to, and approved by, the District. [Regulation 7.25, section 3]
- ii. See Plantwide Specific Conditions.

S2. Monitoring and Record Keeping

[Regulation 2.03, section 6.1]

The owner or operator shall maintain the following records for a minimum of five years and make the records readily available to the District upon request.

⁵⁹ The potential uncontrolled emissions do not exceed the emission limit.

a. Opacity

There are no monitoring or recordkeeping requirements.

b. PM/PM₁₀/PM_{2.5}/TAC/VOC

See Plantwide Specific Conditions.

S3. Reporting

[Regulation 2.03, section 6.1]

The owner or operator shall submit semi-annual compliance reports that include the information in this section. All reports shall include the company name, plant ID number, and the beginning and ending date of the reporting period. The compliance reports shall clearly identify any deviation from a permit requirement or a declaration that there were no such deviations. The compliance reports shall be postmarked within 60 days following the end of each reporting period. All compliance reports shall include the following certification statement per Regulation 2.16, section 3.5.11

- “Based on information and belief formed after reasonable inquiry, I certify that the statements and information in this document are true, accurate, and complete”.
- Signature and title of the responsible official of the company.

The compliance reports are due on or before the following dates of each calendar year:

<u>Reporting Period</u>	<u>Report Due Date</u>
January 1 through June 30	August 29
July 1 through December 31	March 1 of the following year

a. Opacity

There are no reporting requirements for Opacity.

b. PM/PM₁₀/PM_{2.5}/TAC/VOC

See Plantwide Specific Conditions.

203-W70 Comments

1. For EP TT-203-W70-302B, DR-203-W70-501A/B, MX-203-W70-401, and MX-203-W70-402, the potential uncontrolled nitric acid emissions are less than de minimis.